

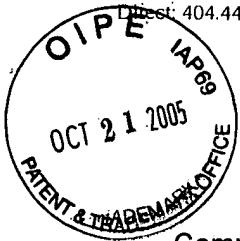
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October 18, 2005

Commissioner for Patents  
P.O. Box 1450  
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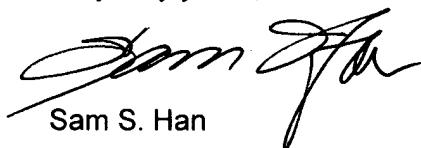
Re: U.S. Patent Application No.: 10/616,750  
Filed: July 10, 2003  
For: **METHOD AND APPARATUS FOR ASSISTING REMOVAL OF SAND  
MOLDINGS FROM CASTINGS**  
Inventor: Lewis, et al.  
Our Reference Number: 2041219-0005

Sir or Madam:

The following documents are forwarded herewith for appropriate action by the U.S. Patent and Trademark Office:

1. Transmittal letter;
2. Transmittal Form;
3. Information Disclosure Statement;
4. PTO Form SB/08;
5. Foreign and non-patent documents cited in IDS (22 total documents); and
6. An acknowledgment postcard.

Very truly yours,



Sam S. Han

SSH/clr  
enclosures

\COM\547558.1



## IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

*In re* Patent Application of:

Docket No.: 2041219-0005

Lewis, et al.

Group Art Unit: 1725

Application No.: 10/616,750

Examiner: Ing-Hour Lin

Filed: July 10, 2003

For: METHOD AND APPARATUS FOR ASSISTING REMOVAL OF SAND  
MOLDINGS FROM CASTINGS

Commissioner for Patents  
P.O. BOX 1450  
Alexandria, VA 22313-1450

### INFORMATION DISCLOSURE STATEMENT

Sir:

Under the provisions of 37 CFR §1.97 through §1.99 and pursuant to the Applicant's duty of disclosure under 37 CFR §1.56, the Applicant respectfully brings the following document(s), listed on the attached form PTO-1449, to the attention of the Examiner in charge of the above-identified application.

This citation does not constitute an admission that the documents are relevant or material to the claims. The documents are only cited as constituting related art of which the Applicant is aware.

The Applicant respectfully requests that the Examiner consider the listed documents and formally make the document of record in this application. Should the Examiner have any questions after consideration of this Information Disclosure Statement, the Examiner is invited to contact the Applicant's undersigned representative at the number below to expedite prosecution.

Please charge any deficiencies in fees and credit any overpayment of fees to our  
Deposit Account No. 23-1951.

Respectfully Submitted,



Sam S. Han  
Reg. No. 51,771

Date: October 18, 2005

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PTO/SB/21 (09-04)  
Approved for use through 07/31/2006. OMB 0651-0031  
U.S. Patent and Trademark Office: U.S. DEPARTMENT OF COMMERCE

## TRANSMITTAL FORM

(to be used for all correspondence after initial filing)

Total Number of Pages in This Submission	Attorney Docket Number	2041219-0005
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### ENCLOSURES (check all that apply)

<input type="checkbox"/> Fee Transmittal Form <input type="checkbox"/> Fee Attached <input type="checkbox"/> Amendment / Reply <input type="checkbox"/> After Final <input type="checkbox"/> Affidavits/declaration(s) <input type="checkbox"/> Extension of Time Request <input type="checkbox"/> Express Abandonment Request <input checked="" type="checkbox"/> Information Disclosure Statement <input type="checkbox"/> Certified Copy of Priority Document(s) <input type="checkbox"/> Reply to Missing Parts/ Incomplete Application <input type="checkbox"/> Reply to Missing Parts under 37 CFR1.52 or 1.53	<input type="checkbox"/> Drawing(s) <input type="checkbox"/> Licensing-related Papers <input type="checkbox"/> Petition <input type="checkbox"/> Petition to Convert to a Provisional Application <input type="checkbox"/> Power of Attorney, Revocation Change of Correspondence Address <input type="checkbox"/> Terminal Disclaimer <input type="checkbox"/> Request for Refund <input type="checkbox"/> CD, Number of CD(s) _____ <input type="checkbox"/> Landscape Table on CD	<input type="checkbox"/> After Allowance Communication to TC <input type="checkbox"/> Appeal Communication to Board of Appeals and Interferences <input type="checkbox"/> Appeal Communication to TC (Appeal Notice, Brief, Reply Brief) <input type="checkbox"/> Proprietary Information <input type="checkbox"/> Status Letter <input checked="" type="checkbox"/> Other Enclosure(s) (please identify below): Acknowledgment Postcard; Copies of Foreign and Non-Patent Documents Cited in IDS
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### Remarks

### SIGNATURE OF APPLICANT, ATTORNEY, OR AGENT

Firm	McGuireWoods LLP, 1170 Peachtree Street, N.E., Suite 2100, Atlanta, Georgia 30309		
Signature			
Printed Name	Sam S. Han		
Date	October 18, 2005	Reg. No.	51,771

### CERTIFICATE OF TRANSMISSION/MAILING

I hereby certify that this correspondence is being facsimile transmitted to the USPTO or deposited with the United States Postal Service with sufficient postage as first class mail in an envelope addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450 on the date shown below.

Signature			
Typed or printed name	Crystal L. Regan	Date	October 18, 2005

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Substitute for form 1449A/PTO				<b>Complete if Known</b>	
<b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>				Application Number	10/616,750
(Use as many sheets as necessary)				Filing Date	July 10, 2003
				First Named Inventor	Lewis, et al.
				Art Unit	1725
				Examiner Name	Ing-Hour Lin
Sheet	2	of	4	Attorney Docket Number	2041219-0005

<b>U.S. PATENT DOCUMENTS</b>					
Examiner Initials *	Cite No. <sup>1</sup>	Document Number		Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document
		Number - Kind Code <sup>2</sup> (if known)			
	AS	US- 3,124,452		03/1964	Kraft
	AT	US- 3,540,519		11/1970	Yates
	AU	US- 620,291		11/1971	Delachapelle
	AV	US- 3,863,702		02/1975	Hallerberg et al.
	AW	US- 3,958,619		05/1976	Petersen et al.
	AX	US- 4,222,429		09/1980	Kemp
	AY	US- 4,347,890		09/1982	Aillin-Pyzik et al.
	AZ	US- 4,399,858		08/1983	Kurabe et al.
	BA	US- 4,548,256		10/1985	Glinn et al.
	BB	US- 4,607,091		08/1986	Schreiber
	BC	US- 4,629,708		12/1986	Alexander et al.
	BD	US- 5,143,665		09/1992	Clubbs et al.
	BE	US- 5,158,130		10/1992	Sahari
	BF	US- 5,294,648		03/1994	Smith et al.
	BG	US- 5,333,673		08/1994	Hughes
	BH	US- 5,573,055		11/1996	Melling et al.
	BI	US- 5,725,044		03/1998	Hirokawa
	BJ	US- 5,810,918		09/1998	Landis
	BK	US- 5,913,354		06/1999	Conroy et al.
	BL	US- 5,957,188		09/1999	Crafton
	BM	US- 6,139,619		10/2000	Zaretskiy
	BN	US- 6,336,809		01/2002	Crafton
	BO	US- 6,390,178		05/2002	Makino
	BP	US- 6,447,593		09/2002	Sargent et al.
	BQ	US- 6,469,299		10/2002	Chutjian et al.
	BR	US- 6,547,556		04/2003	Crafton et al.

<b>FOREIGN PATENT DOCUMENTS</b>					
Examiner Initials *	Cite No. <sup>1</sup>	Foreign Patent Document		Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document
		Country Code <sup>3</sup> - Number <sup>4</sup> - Kind Code <sup>5</sup> (if known)			
	AH	EP 0 119 365 B1		09/1987	
	AI	DE 36 16 168 A1		11/1987	
	AJ	(Japan) 5-169185		07/1993	
	AK	FR 2 614 814 A3		11/1988	
	AL	DE 32 15 809 C1		11/1983	
	AM	GB 2 248 569 A		04/1992	
	AN	WO 93 19870		10/1993	

Examiner Signature		Date Considered
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\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. <sup>1</sup> Applicant's unique citation designation number (optional). <sup>2</sup> See Kinds Codes of USPTO Patent Documents at [www.uspto.gov](http://www.uspto.gov) or MPEP 901.04. <sup>3</sup> Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). <sup>4</sup> For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. <sup>5</sup> Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. <sup>6</sup> Applicant is to place a check mark here if English language Translation is attached.

This collection of information is required by 37 CFR 1.97 and 1.98. The information is required to obtain or retain a benefit by the public which is to file (and by the USPTO to process) an application. Confidentiality is governed by 35 U.S.C. 122 and 37 CFR 1.14. This collection is estimated to take 2 hours to complete, including gathering, preparing, and submitting the completed application form to the USPTO. Time will vary depending upon the individual case. Any comments on the amount of time you require to complete this form and/or suggestions for reducing this burden, should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, U.S. Department of Commerce, P.O. Box 1450, Alexandria, VA 22313-1450. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

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Substitute for form 1449A/PTO		Complete if Known	
<b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b> <i>(Use as many sheets as necessary)</i>		Application Number	10/616,750
		Filing Date	July 10, 2003
		First Named Inventor	Lewis, et al.
		Art Unit	1725
		Examiner Name	Ing-Hour Lin
Sheet	3	of	4
		Attorney Docket Number	2041219-0005

## U.S. PATENT DOCUMENTS

## FOREIGN PATENT DOCUMENTS

Examiner Signature		Date Considered	
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\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant. Applicant's unique citation designation number (optional). <sup>2</sup> See Kinds Codes of USPTO Patent Documents at [www.uspto.gov](http://www.uspto.gov) or MPEP 901.04. <sup>3</sup> Enter Office that issued the document, by the two-letter code (WIPO Standard ST.3). <sup>4</sup> For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. <sup>5</sup> Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. <sup>6</sup> Applicant is to place a check mark here if English language Translation is attached.

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Substitute for form 1449B/PTO

# INFORMATION DISCLOSURE STATEMENT BY APPLICANT

(Use as many sheets as necessary)

Sheet

4

of

4

## Complete if Known

Application Number	10/616,750
Filing Date	July 10, 2003
First Named Inventor	Lewis, et al.
Art Unit	1725
Examiner Name	Ing-Hour Lin
Attorney Docket Number	2041219-0005

NON PATENT LITERATURE DOCUMENTS			
Examiner Initials *	Cite No. <sup>1</sup>	Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city and/or country where published.	T <sup>2</sup>
	AA	Patent Abstracts of Japan, JP-60247458 (Mazda Motor Corp.) December 7, 1985	
	AB	NIEDLING, JAKE J. et al., "Evaluating RSI Sows For Safe Charging Into Molten Metal," Light Metals 2003, TMS (The Minerals, Metals & Materials Society), 2003, pp. 695-700	
	AC	EKENES, J. MARTIN et al., "Cause and Prevention of Explosions Involving Hot-Top Casting of Aluminum Extrusion Ingots," Light Metals 2003, TMS (The Minerals, Metals & Materials Society), 2003, pp. 687-693	
	AD	Patent Abstracts of Japan, vol. 010, no. 118, 2 May 1986 & JP 60 247458 (Mazda KK) 7 December 1985	
	AE	Patent Abstracts of Japan; Publication No. 61007058; Publication Date 13-01-86	
	AF	Patent Abstracts of Japan, Vol. 11, No. 094 25 March 1987 & JP 61 245938, Asahi Organic Chem. Ind. Co. Ltd., 1 November 1986	
	AG	VELTRUP E.M., "Kurze Entkernungszeiten Beim Entkernen Mit Hochdruckwasserstrah," Giesserei, Giesserei Verlag, Dusseldorf, Germany, Vol. 74, No. 4, 18 February 1987, pages 102-104	

Examiner Signature	Date Considered
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\*EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

<sup>1</sup>Applicant's unique citation designation number (optional). <sup>2</sup>Applicant is to place a check mark here if English language Translation is attached.

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If you need assistance in completing the form, call 1-800-PTO-9199 and select option 2.



Substitute for form 1449A/PTO				<b>Complete if Known</b>	
<b>INFORMATION DISCLOSURE STATEMENT BY APPLICANT</b>				Application Number	10/616,750
(Use as many sheets as necessary)				Filing Date	July 10, 2003
				First Named Inventor	Lewis, et al.
				Art Unit	1725
				Examiner Name	Ing-Hour Lin
Sheet	1	of	4	Attorney Docket Number	2041219-0005

<b>U.S. PATENT DOCUMENTS</b>					
Examiner Initials *	Cite No. <sup>1</sup>	Document Number	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Number - Kind Code <sup>2</sup> (if known)			
	AA	US-6,622,775	09/23/2003	Crafton et al.	
	AB	US- 6,672,367	01/06/2004	Crafton et al.	
	AC	US- 2004/0055728	03/25/2004	Lewis, Jr. et al.	
	AD	US- 2005/0022957	02/03/2005	Crafton et al.	
	AE	US- 2005/0072549	04/07/2005	Crafton et al.	
	AF	US- 2005/0145362	07/07/2005	Crafton et al.	
	AG	US- 4,582,118	04/15/1986	Jacoby et al.	
	AH	US- 4,610,295	09/09/1986	Jacoby et al.	
	AI	US- 4,709,740	12/01/1987	Jacoby et al.	
	AJ	US- 4,724,887	02/16/1988	Jacoby et al.	
	AK	US- 4,987,950	01/29/1991	Yu	
	AL	US- 5,148,853	09/22/1992	Yu et al.	
	AM	US- 5,681,407	10/28/1997	Yu et al.	
	AN	US- 5,820,705	10/13/1998	Yu et al.	
	AM	US- 5,915,452	06/29/1999	Conroy et al.	
	AN	US- 22,865	02/1859	Gardiner	
	AO	US- 185,376	12/1876	Whitehouse	
	AP	US- 381,655	04/1888	Stover	
	AQ	US- 927,495	07/1909	Custer	
	AR	US- 1,241,867	10/1917	McMillen	

<b>FOREIGN PATENT DOCUMENTS</b>					
Examiner Initials*	Cite No. <sup>1</sup>	Foreign Patent Document	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document	Pages, Columns, Lines, Where Relevant Passages or Relevant Figures Appear
		Country Code <sup>3</sup> - Number <sup>4</sup> - Kind Code <sup>5</sup> (if known)			
	AA	CH 622 726 A5	04/30/1981	Kohlswa Jernverks Aktiebolaget, Kolsva (SE)	
	AB	GB 1 549 220	07/25/1979	Back et al. (English Text)	
	AC	EP 0 744 233 A3	11/27/1996	Howmet Corporation (English Text)	
	AD	EP 0 141 666	05/15/1985	Ford Motor Company Limited (English Text)	
	AE	EP 0 141 666 A2	05/15/1985	Ford France Societe Anonyme	
	AF	CH 622 726 A5	04/30/1981	Kohlswa Jernverks AB	
	AG	EP 0 744 233 A2	11/27/1996	Howmet Corporation	

Examiner Signature	Date Considered
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